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09/547,543

PATENT

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Applicant:	**Beatty et al.**	Examiner:	**D. McCrosky**
Serial No.:	**09/547,543**	Group Art Unit:	**3736**
Filing Date:	**4/12/2000**	Docket No.:	**1931**
Title	**Method of Mapping Heart Electrophysiology**		

Date of Deposit: 2/24/03
I hereby certify that this paper is being deposited in the United States Postal Service, as first class mail, in an envelope addressed to: Assistant Commissioner for Patents, Washington, DC 20231

Signature: Robert C Beck
Printed Name: Robert C. Beck

Amendment

Assistant Commissioner for Patents
Washington, DC 20231

This is responsive to the outstanding Office Action mailed September 23, 2002, and identified as paper number 4. Reconsideration and allowance of this application is respectfully solicited in view of the following amendments and remarks.

Please amend the above-identified application for patent as follows:

Replace the first paragraph with the following:

--This application is a divisional of Ser. No. 09/005,105, filed Jan. 9, 1998 which is a divisional application of Ser. No. 08/387,832, filed May 26, 1995, now U.S. Pat. No. 6,240,307 which is a national stage application of PCT/US93/09015, filed Sept. 23,1992, which in turn claims priority from U.S.S.N. 07/950,448, filed Sept. 23, 1992, now U.S. Pat. No. 5,295,549 and U.S.S.N. 07/949,690, filed Sept. 23, 1992, now U.S. Pat.No. 5,311,866. Applicants claim priority to: 08/387,832, filed May 26, 1995, now U.S. Pat. No.

6,240,307; Ser. No. 08/376,067 filed Aug. 20 1995, now U.S. Pat. No. 5,553,611; and Ser. No. 08/178,128 filed Jan. 6, 1994, now abandoned.--

Kindly cancel claim 1 and rewrite claim 3 as follows:

1. A process for measuring electrophysiologic data in a heart chamber comprising the steps of:

positioning a set of passive electrodes within a patient's heart;

positioning a set of active electrodes within a patient's heart;

supplying oscillating current to said set of active electrodes thereby generating an electric field in said heart chamber;

detecting said electric field at said passive electrode sites, generating a set of electric field measurement data;

extracting in the frequency domain, from said field measurement data, that component of said field measurement data corresponding to chamber geometry and generating chamber geometry data;

extracting in the frequency domain, from said field measurement data, that component of said field measurement data corresponding to the underlying intrinsic electrophysiologic activity of the heart chamber, and generating electrophysiology data;

graphically displaying said chamber geometry data; and

graphically displaying said electrophysiologic data.

2. A process for measuring electrophysiologic data in a heart chamber comprising the steps of:

positioning a set of passive electrodes within patient's heart;

positioning a set of active electrodes within a patient's heart;

supplying oscillating current to said set of active electrodes thereby generating an electric field in said heart chamber;

detecting said electric field at said passive electrode sites, generating a set of field measurement data;

extracting in the time domain, from said field measurement data, that component of said field measurement data corresponding to the underlying electrophysiologic activity of the heart chamber, and generating electrophysiology data;